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#### REVIEW

✓ **"HOW TO KNOW THE FERNS AND FERN ALLIES,"** by John T. Mickel, 1979. Wm. C. Brown Company Publishers, Dubuque, Iowa. \$7.95 hardcover, \$5.95 wire coil bound.—In the standard format of the Pictured Key Nature Series, this book provides the information needed to identify North American ferns and fern allies. Introductory chapters on structure, life history, hybridization, cultivation, collection, and nomenclature provide a basic understanding of ferns and fern allies and the terminology needed to identify these plants successfully. This also makes the work useful as a textbook or handbook for amateur pteridologists.

The greatest part of the volume consists of bracketed keys which lead the user to the appropriate genus and species. Diagnostic characters for each species, provided in the annotated keys, are supplemented by a brief description, habitat preference, frequency of occurrence, and distribution map, as well as an illustration for nearly every species. Limited synonymy is also included. Hybrids and infraspecific taxa are mentioned with related species. Problems in taxonomy are explained so that the basis for confusion can be understood. The genera are listed alphabetically, enabling the experienced pteridologist to turn to the appropriate genus and begin keying at that point. The uninitiated can begin with the generic key that is found near the beginning of the book. Edgar Paulton's line drawings are quite good and in general capture the distinguishing characteristics of each species. The book concludes with a listing of state and regional identification manuals, a checklist of North American (United States and Canada) ferns and fern allies, and an index which includes a glossary.

The information contained in this volume is presented in a clear and concise manner using currently accepted taxonomy and nomenclature. Anyone who has an interest in North American ferns or fern allies should have a copy of this book. Dr. Mickel is to be congratulated for condensing and synthesizing a great amount of information into the kind of reasonably priced book amateur and professional pteridologists alike have long awaited.—*W. Carl Taylor, Department of Botany, Milwaukee Public Museum, Milwaukee, WI 53233.*